



Course: Managing Software Development Projects

Contact Hours: 24

Pre-requisite: Basic knowledge of IT and Project Management

Course Objectives

This course is designed to allow participants to understand the various techniques for managing a software development project. It builds on core concepts in the field of software development and provides an understanding of both theoretical and methodological issues involved in modern software engineering project management and focuses on practical application of techniques.

Target Audience

- Software developers
- Software development project managers
- Systems Analysts
- Self-taught users desirous of enhancing their knowledge
- Interested members of the general public

Learning Outcomes

On completion of this course, learners will be able to:

1. Draw upon appropriate techniques and have sufficient background knowledge to ensure good software engineering practices are followed.
2. Have the ability to select tools and methodologies that are the correct fit for the project at hand
3. Structure a project into components and evaluate each step
4. Demonstrate a broader understanding of software engineering as a discipline, recognizing its relationship and interaction with other design disciplines.
5. Apply various project management tools to a software project

Course Content

1. Introduction to Software Engineering and Project Management

- Introduction to program
- Introduction to Software Development Process
- Introduction to methodologies
- Developing key artifacts for the project
- Work Break Down Structure
- Understand the roles of the project manager

2. The Software Process

- Detailed look at Agile – SCRUM method for software development
- Look at the difference between system and user requirements and the difference between functional and non-functional requirements
- Identify tools required for information gathering
- System Modeling

3. Planning, Costing and Scheduling

- Development of a Gantt Chart
- Estimating Cost using various models
- Project budgeting techniques
- Financial projection techniques

4. Risk and Quality Management

- What is risk?
- Methods to identify and manage risks in a project
- Case study

5. Network Diagrams

- Explore and examine various types of network diagrams to be used in project management

6. Software Testing and final review

- Various techniques and models for testing application will be explored
- Final review of course